WHAT IS CLAIMED IS:

1. A nitride-based semiconductor laser device comprising:

a substrate consisting of either a nitride-based semiconductor doped with an impurity or a boride-based material;

an n-type cladding layer formed on said substrate;

an active layer consisting of a nitride-based semiconductor formed on said n-type cladding layer;

a p-type cladding layer formed on said active layer; and

a light guide layer formed only between said active layer and said p-type cladding layer in the interspaces between said active layer and said n-type and p-type cladding layers.

2. The nitride-based semiconductor laser device according to claim 1, wherein

said substrate absorbs part of light generated in said active layer.

3. The nitride-based semiconductor laser device according to claim 2, wherein

said impurity doped into said substrate is oxygen.

4. The nitride-based semiconductor laser device according to claim 1, wherein

said n-type cladding layer is undoped.

5. The nitride-based semiconductor laser device according to claim 1, wherein

said n-type cladding layer is doped with Ge.

6. The nitride-based semiconductor laser device according to claim 1, further comprising a layer, formed between said substrate and said n-type cladding layer, consisting of an undoped nitride-based semiconductor.

7. The nitride-based semiconductor laser device according to claim 1, further comprising a layer, formed between said substrate and said n-type cladding layer, consisting of a nitride-based semiconductor doped with Ge.

8. The nitride-based semiconductor laser device according to claim 1, wherein

said substrate includes either a GaN substrate or a ZrB_2 substrate.

9. The nitride-based semiconductor laser device

according to claim 1, wherein

said p-type cladding layer includes a p-type cladding layer consisting of a nitride-based semiconductor having a lattice constant smaller than the lattice constant of GaN, and

said light guide layer is constituted of a nitride-based semiconductor having a lattice constant larger than the lattice constant of GaN.

10. The nitride-based semiconductor laser device according to claim 9, wherein

said light guide layer consists of InGaN.

11. The nitride-based semiconductor laser device according to claim 1, wherein

said light guide layer is undoped.

12. The nitride-based semiconductor laser device according to claim 1, further comprising an n-type carrier blocking layer, formed between said n-type cladding layer and said active layer, consisting of a nitride-based semiconductor having a refractive index smaller than the refractive index of said n-type cladding layer.

13. The nitride-based semiconductor laser device

according to claim 12, wherein

said n-type cladding layer includes an n-type cladding layer consisting of AlGaN having a first Al composition ratio, and

said n-type carrier blocking layer includes an n-type carrier blocking layer consisting of AlGaN having a second Al composition ratio larger than said first Al composition ratio.

14. The nitride-based semiconductor laser device according to claim 1, further comprising an n-type carrier blocking layer, formed between said n-type cladding layer and said active layer, consisting of a nitride-based semiconductor having a band gap larger than the band gap of said n-type cladding layer and the band gap of said active layer.

15. The nitride-based semiconductor laser device according to claim 14, wherein

said n-type cladding layer includes an n-type cladding layer consisting of AlGaN having a first Al composition ratio while said active layer includes an active layer consisting of InGaN, and

said n-type carrier blocking layer includes an n-type carrier blocking layer consisting of AlGaN having a second

Al composition ratio larger than said first Al composition ratio.

16. The nitride-based semiconductor laser device according to claim 1, further comprising an impurity introduction layer formed by introducing an impurity into a region other than said p-type cladding layer and a current path part of a nitride-based semiconductor layer formed on said p-type cladding layer.

17. The nitride-based semiconductor laser device according to claim 16, wherein

said impurity introduction layer is an ion implantation layer.

18. The nitride-based semiconductor laser device according to claim 16, wherein

said impurity includes carbon, and

the maximum value of the impurity concentration of carbon in said impurity introduction layer is at least about 5×10^{19} cm^{-3}.

19. The nitride-based semiconductor laser device according to claim 1, further comprising an undoped p-side contact layer formed on said p-type cladding layer.

20. The nitride-based semiconductor laser device according to claim 19, wherein

said active layer includes an active layer of a quantum well structure consisting of a nitride-based semiconductor containing In, and

said undoped p-side contact layer has a thickness smaller than the thickness of a quantum well layer of said active layer and an In composition ratio smaller than the In composition ratio of said quantum well layer.

21. The nitride-based semiconductor laser device according to claim 20, wherein

the thickness of said undoped p-side contact layer is at least about 3 nm and not more than 5 nm.

22. The nitride-based semiconductor laser device according to claim 20, wherein

the In composition ratio of said undoped p-side contact layer is at least about 0.05 and smaller by at least about 0.05 than the In composition ratio of said quantum well layer of said active layer.